

Another Dry Year for Agriculture

Except for scattered showers and tropical storm remnants, weather for 2001 was generally dry. As in the past year, crops such as coffee, macadamia nuts, avocados, and tropical fruits which depend on rainfall for irrigation, made only fair progress. Pastures also suffered from the prolonged lack of soil moisture. Although irrigated crops fared better, some farms were adversely affected by both mandatory and voluntary water conservation restrictions. Despite increased rainfall over the previous year, conditions were generally dry, especially in leeward and central districts.

January-April

A January cold front in the north brought generally fair weather. Conditions were characterized by light showers and mostly cool, dry weather. Light to moderate winds further dried the islands. Water conservation notices were issued to State irrigation users in Waimea, Hawaii. The winter drought continued into early February extending the conservation measures on the Big Island. Although an offshore thunderstorm and a string of low pressure systems brought beneficial showers to the State later in the month, growing conditions were mostly fair, and more rain was needed in all areas. A low pressure system accompanied by a weak cold front returned to the islands in March, bringing clouds and scattered light to moderate showers. Lack of good follow-up showers disrupted the coffee flowering flush in Central Kona. Fruit set was low, and young cherries were dying. Fluctuating sunny and cloudy conditions enhanced disease infections on other crops. April weather was favorable for agriculture during the first week, but returned to fair for the rest of the month. Trade winds were gusty up to 40 mph in exposed areas. Despite sunny days and beneficial showers, soil moisture

remained inadequate, especially on Hawaii and Maui. Coffee, avocado, and other rainfall dependent orchard crops continued to suffer dryness. Pastures were also dry, and showed little growth.

May-September

Variable weather in May brought beneficial showers and warm sunshine. However, heavy irrigation and water conservation restrictions remained necessary in dry areas. Regular spraying was needed to control insects and diseases. The favorable weather continued through June and July. Remnants of Tropical Storm Barbara brought moderate to heavy showers and relief to seriously dry areas. After the storm at the beginning of the month, July's weather turned sunny and dry with light showers falling in windward and some mountain areas. Leeward and central areas remained hot and dry; especially Maui, which did not receive significant rain for weeks. Rainfall dependent crops and pastures remained in poor condition. Remnants of Tropical Storm Dahlia brought temporary relief from dry conditions in early August. Light, scattered showers made heavy irrigation and spraying necessary to maintain crop progress. Crops and pastures were in fair to poor condition throughout the remainder of the month. September trades strengthened to moderate levels and brought hot, humid days with late afternoon and evening showers. Despite increased showers, heavy irrigation remained necessary. The variable weather continued into the end of the month when a weak low pressure trough brought brief windward and mountain showers.

October-December

A strengthening northern high pressure system brought increased

trade winds and some passing showers to windward and mountain areas. Despite stronger trade winds and passing showers, October remained generally dry. Tropical Storm Narda's remnants at the end of the month brought increased windward, mauka showers and stronger trade winds to portions of the State. A thunderstorm dumped heavy rains on East Hawaii at the month's end. Hilo received over 14 inches in nine hours, causing minor flooding in low-lying areas. A weak high pressure system and the remnants of Tropical Storm Octave brought more variable weather in November. Light to moderate trade showers fell mainly on Windward and mountain areas. Trade winds ranged from 15 to 30 mph. During the last two weeks, the weak northern high pressure system diminished showers and weakened winds to 5-15 mph. Spraying for insects and diseases was intensified. Although drier conditions benefitted some crops, orchards and pastures still needed more rainfall. Early December's Kona storm brought the year's first major rain to the State. Up to 19 inches was reported in Ka'u, Hawaii during a 48 hour period. Gusty winds up to 60 mph were also reported. Some flooding occurred in low-lying areas, and orchards reported fruit losses as well as tree and leaf damage. Wet conditions also hindered farm activities. A second major storm at mid-month brought more heavy rains and gusty winds. Farm operations were further hindered and disease incidence increased drastically. However, the two major storms brought much needed rain to all islands and replenished soil moisture levels and severely depleted water supplies. The remainder of the year ended with generally dry conditions and weakening trade winds.